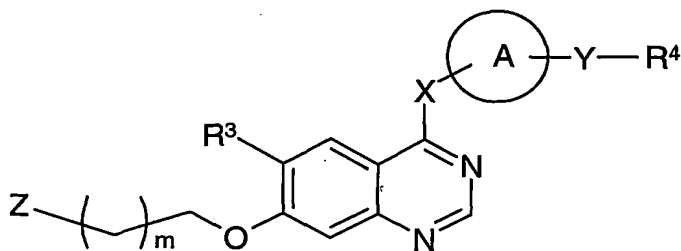


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CLAIMS

1. A compound of formula (I):



5

formula (I)

wherein **A** is 6-membered heteroaryl containing a nitrogen atom and optionally containing one or two further nitrogen atoms;

**X** is O, S, S(O), S(O)<sub>2</sub> or NR<sup>14</sup>;

10 **m** is 0, 1, 2, 3 or 4;

**Y** is a group selected from O, NR<sup>5</sup>CO, CONR<sup>5</sup>, CR<sup>6</sup>R<sup>7</sup>CONR<sup>5</sup> and CR<sup>6</sup>R<sup>7</sup>NR<sup>5</sup>;

**Z** is a group selected from -NR<sup>1</sup>R<sup>2</sup>, phosphonooxy, C<sub>3-6</sub>cycloalkyl which C<sub>3-6</sub>cycloalkyl is substituted by phosphonooxy or C<sub>1-4</sub>alkyl substituted by phosphonooxy, and a 4- to 7-membered ring linked via a carbon atom containing a nitrogen atom and optionally containing  
15 a further nitrogen atom, which ring may be saturated, unsaturated or partially saturated which ring is substituted on carbon or nitrogen by phosphonooxy or C<sub>1-4</sub>alkyl (substituted by phosphonooxy) and which ring is optionally further substituted on carbon or nitrogen by 1, 2 or 3 halo or C<sub>1-4</sub>alkyl groups;

**R<sup>1</sup>** is a group selected from -COR<sup>8</sup>, -CONR<sup>8</sup>R<sup>9</sup> and C<sub>1-6</sub>alkyl which C<sub>1-6</sub>alkyl is substituted  
20 by phosphonooxy and optionally further substituted by 1 or 2 halo or methoxy groups;

**R<sup>2</sup>** is a group selected from hydrogen, -COR<sup>10</sup>, -CONR<sup>10</sup>R<sup>11</sup> and C<sub>1-6</sub>alkyl which C<sub>1-6</sub>alkyl is optionally substituted by 1, 2 or 3 halo or C<sub>1-4</sub>alkoxy groups, -S(O)<sub>p</sub>R<sup>11</sup> (where p is 0, 1 or 2) or phosphonooxy, or **R<sup>2</sup>** is a group selected from C<sub>2-6</sub>alkenyl, C<sub>2-6</sub>alkynyl, C<sub>3-6</sub>cycloalkyl and C<sub>3-6</sub>cycloalkylC<sub>1-4</sub>alkyl;

25 or **R<sup>1</sup>** and **R<sup>2</sup>** together with the nitrogen to which they are attached form a 4- to 7- membered ring optionally containing a further nitrogen atom which ring may be saturated, unsaturated or partially saturated which ring is substituted on carbon or nitrogen by a group selected from phosphonooxy and C<sub>1-4</sub>alkyl substituted by phosphonooxy or -NR<sup>8</sup>R<sup>9</sup>, and which ring is optionally further substituted on carbon or nitrogen by 1, 2 or 3 halo or C<sub>1-4</sub>alkyl groups;

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$R^3$  is a group selected from hydrogen, halo, cyano, nitro,  $C_{1-6}$ alkoxy,  $C_{1-6}$ alkyl,  $-OR^{12}$ ,  $-CHR^{12}R^{13}$ ,  $-OC(O)R^{12}$ ,  $-C(O)R^{12}$ ,  $-NR^{12}C(O)R^{13}$ ,  $-C(O)NR^{12}R^{13}$ ,  $-NR^{12}SO_2R^{13}$  and  $-NR^{12}R^{13}$ ;

$R^4$  is hydrogen or a group selected from  $C_{1-4}$ alkyl, heteroaryl, heteroaryl $C_{1-4}$ alkyl, aryl and aryl $C_{1-4}$ alkyl which group is optionally substituted by 1, 2 or 3 substituents selected from halo, methyl, ethyl, cyclopropyl and ethynyl;

$R^5$  is a group selected from hydrogen,  $C_{1-4}$ alkyl,  $C_{2-4}$ alkenyl,  $C_{2-4}$ alkynyl,  $C_{3-6}$ cycloalkyl and  $C_{3-6}$ cycloalkyl $C_{1-4}$ alkyl;

$R^6$  and  $R^7$  are independently selected from hydrogen, halo,  $C_{1-4}$ alkyl,  $C_{3-6}$ cycloalkyl, hydroxy and  $C_{1-4}$ alkoxy;

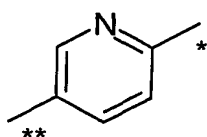
$R^8$  is  $C_{1-4}$ alkyl substituted by phosphonooxy and optionally further substituted by 1 or 2 halo or methoxy groups;

$R^9$  is selected from hydrogen and  $C_{1-4}$ alkyl;

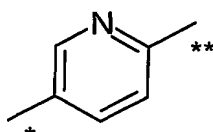
$R^{10}$  is selected from hydrogen and  $C_{1-4}$ alkyl which  $C_{1-4}$ alkyl is optionally substituted by halo,  $C_{1-4}$ alkoxy,  $S(O)_q$  (where  $q$  is 0, 1 or 2) or phosphonooxy;

$R^{11}$ ,  $R^{12}$ ,  $R^{13}$  and  $R^{14}$  are independently selected from hydrogen,  $C_{1-4}$ alkyl and heterocyclyl; or a pharmaceutically acceptable salt thereof.

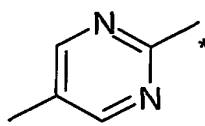
2. A compound according to claim 1 wherein A is a group of formula (a), (b), (c) or (d):



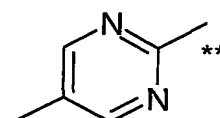
(a)



(b)



(c)



(d)

where \* is the point of attachment to the X group of formula (I) and \*\* is the point of attachment to the Y group of formula (I); or a pharmaceutically acceptable salt thereof.

3. A compound according to claim 2 wherein A is a group of formula (b) or (d) as defined in claim 2; or a pharmaceutically acceptable salt thereof.

4. A compounds according to any one of claims 1, 2 or 3 wherein X is NH; or a pharmaceutically acceptable salt thereof.

5. A compound according to any one of the preceding claims wherein Z is a group selected from  $-NR^1R^2$ , phosphonooxy, cyclopropyl which cyclopropyl is substituted by  $C_1$ .

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4alkyl substituted by phosphonooxy, and a piperidine or piperazine ring linked via carbon which ring is substituted on carbon or nitrogen by phosphonooxy or C<sub>1-4</sub>alkyl substituted by phosphonooxy; or a pharmaceutically acceptable salt thereof.

5 6. A compound according to any one of the preceding claims wherein R<sup>1</sup> is C<sub>1-5</sub>alkyl substituted by phosphonooxy and R<sup>2</sup> is hydrogen, C<sub>1-5</sub>alkyl, C<sub>2-4</sub>alkynyl or C<sub>3-6</sub>cycloalkyl; or a pharmaceutically acceptable salt thereof.

7. A compound according to any one of claims 1 to 5 wherein R<sup>1</sup> and R<sup>2</sup> together with  
10 the nitrogen to which they are attached form a piperidine, pyrrolidine or piperazine ring which is substituted on carbon or nitrogen by a group selected from phosphonooxy, phosphonooxymethyl and 2-phosphonooxyethyl and where the ring is optionally further substituted on carbon or nitrogen by 1 or 2 methyl.

15 8. A compound according to any one of the preceding claims wherein R<sup>3</sup> is methoxy or hydrogen; or a pharmaceutically acceptable salt thereof.

9. A compound according to any one of the preceding claims wherein R<sup>4</sup> is phenyl or benzyl optionally substituted by 1 or 2 of fluoro or chloro; or a pharmaceutically acceptable  
20 salt thereof.

10. A compound selected from:

3-[(3-{[4-({6-[(3-chlorobenzyl)oxy]pyridin-3-yl} amino)-6-methoxyquinazolin-7-yl]oxy}propyl)amino]-3-methylbutyl dihydrogen phosphate;

25 3-[(3-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl} amino)-6-methoxyquinazolin-7-yl]oxy}propyl)amino]-3-methylbutyl dihydrogen phosphate;

2-[(3-{[4-({6-[(3 chlorobenzoyl)amino]pyridin-3-yl} amino)-6-methoxyquinazolin-7-yl]oxy}propyl)(ethyl)amino]ethyl dihydrogen phosphate;

2-[(1-(3-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl} amino)-6-methoxyquinazolin-7-yl]oxy}propyl)piperidin-2-yl]ethyl dihydrogen phosphate;

30 [(2R)-1-(3-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl} amino)-6-methoxyquinazolin-7-yl]oxy}propyl)pyrrolidin-2-yl]methyl dihydrogen phosphate;

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- 2-[1-(3-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)piperidin-4-yl]ethyl dihydrogen phosphate;
- 2-[ethyl(3-{[4-({6-[(3-fluorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)amino]ethyl dihydrogen phosphate;
- 5 2-[(3-{[4-({6-[(3,4-difluorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)(isopropyl)amino]ethyl dihydrogen phosphate;
- (3-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)piperidin-4-yl dihydrogen phosphate;
- 4-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}butyl dihydrogen phosphate;
- 10 2-[(3-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)(methyl)amino]ethyl dihydrogen phosphate;
- [1-(3-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)piperidin-2-yl]methyl dihydrogen phosphate;
- 15 2-[(5-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}pentyl)(ethyl)amino]ethyl dihydrogen phosphate;
- 4-[(3-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)(ethyl)amino]butyl dihydrogen phosphate;
- 2-[(3-{[4-({6-[(3-fluorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)(methyl)amino]ethyl dihydrogen phosphate;
- 20 2-[(3-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)(isobutyl)amino]ethyl dihydrogen phosphate;
- 2-[(3-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)(cyclopropyl)amino]ethyl dihydrogen phosphate;
- 25 [1-(3-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)piperidin-4-yl]methyl dihydrogen phosphate;
- 2-[4-(3-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)piperazin-1-yl]ethyl dihydrogen phosphate;
- [(2*S*)-1-(3-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)pyrrolidin-2-yl]methyl dihydrogen phosphate;
- 30 2-[(3-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)(cyclobutyl)amino]ethyl dihydrogen phosphate;

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- 2-[(3-{[4-({6-[(3-chlorobenzoyl)amino]pyridin-3-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)(prop-2-yn-1-yl)amino]ethyl dihydrogen phosphate;
- 2-[(3-{[4-({2-[(3-chloro-4-fluorobenzoyl)amino]pyrimidin-5-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)(cyclohexyl)amino]ethyl dihydrogen phosphate;
- 5 2-[(3-{[4-({2-[(3-chloro-4-fluorobenzoyl)amino]pyrimidin-5-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)(ethyl)amino]ethyl dihydrogen phosphate;
- 3-{[4-({2-[(3-chlorobenzoyl)amino]pyrimidin-5-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl dihydrogen phosphate;
- 1-[3-({4-[(2-[(3-chloro-4-fluorophenyl)amino]methyl}pyrimidin-5-yl)amino]-6-methoxyquinazolin-7-yl]oxy}propyl]piperidin-4-yl dihydrogen phosphate;
- 10 3-[(3-{[4-({2-[(3-chloro-4-fluorobenzoyl)oxy]pyrimidin-5-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)amino]-3-methylbutyl dihydrogen phosphate;
- 2-[(3-{[4-({2-[(3-chlorobenzoyl)amino]pyrimidin-5-yl}amino)-6-methoxyquinazolin-7-yl]oxy}propyl)(2,2-dimethylpropyl)amino]ethyl dihydrogen phosphate;
- 15 [2-({[4-({2-[(3-chloro-4-fluorobenzoyl)amino]pyrimidin-5-yl}amino)-6-methoxyquinazolin-7-yl]oxy}methyl)cyclopropyl]methyl dihydrogen phosphate; and
- 2-[4-({[4-({2-[(3-chloro-4-fluorobenzoyl)amino]pyrimidin-5-yl}amino)-6-methoxyquinazolin-7-yl]oxy}methyl)piperidin-1-yl]ethyl dihydrogen phosphate;
- or a pharmaceutically acceptable salt thereof.
- 20
11. A pharmaceutical composition comprising a compound according to any one of the preceding claims or a pharmaceutically acceptable salt thereof in association with a pharmaceutically acceptable diluent or carrier.
- 25 12. Use of a compound according to any one of claims 1 to 10 in therapy.
13. Use of a compound according to any one of claims 1 to 10 in the preparation of a medicament for the treatment of a disease where the inhibition of one or more Aurora kinase is beneficial.
- 30
14. Use according to claim 13 wherein Aurora kinase is Aurora-A kinase or Aurora-B kinase.

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15. Use of a compound according to any one of claims 1 to 10 or a pharmaceutically acceptable salt thereof, in the preparation of a medicament for the treatment of hyperproliferative diseases such as cancer and in particular colorectal, breast, lung, prostate, pancreatic or bladder and renal cancer or leukemias or lymphomas.

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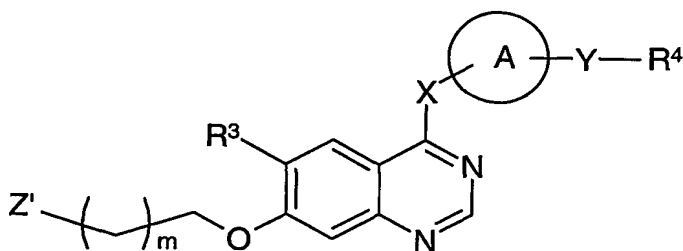
16. A method of treating a human suffering from a disease in which the inhibition of one or more Aurora kinases is beneficial to the treatment, comprising the steps of administering to a person in need thereof a therapeutically effective amount of a compound as defined in claim 1 or a pharmaceutically acceptable salt thereof.

10

17. A method of treating a human suffering from colorectal, breast, lung, prostate, pancreatic or bladder and renal cancer or leukemias or lymphomas, comprising the steps of administering to a person in need thereof a therapeutically effective amount of a compound as defined in claim 1 or a pharmaceutically acceptable salt thereof.

15

18. A process for the preparation of a compound of formula (I) as defined in claim 1 or a pharmaceutically acceptable salt thereof, which process comprises converting a compound of formula (II) into a compound of formula (I) by phosphorylation of an appropriate hydroxy group:



20

formula (II)

where A, X, m, Y, R<sup>3</sup> and R<sup>4</sup> are as defined for formula (I); and Z' is a group selected from –NR<sup>1'</sup>R<sup>2'</sup>, hydroxy, C<sub>3-6</sub>cycloalkyl which C<sub>3-6</sub>cycloalkyl is substituted by hydroxy or C<sub>1-4</sub>alkyl substituted by hydroxy, and a 4- to 7-membered ring linked via a carbon atom, containing a  
 25 nitrogen atom and optionally containing a further nitrogen atom, which ring may be saturated, unsaturated or partially saturated and which ring is substituted on carbon or nitrogen by hydroxy or C<sub>1-4</sub>alkyl substituted by hydroxy and which ring is optionally further substituted on carbon or nitrogen by 1, 2 or 3 halo or C<sub>1-4</sub>alkyl groups; R<sup>1'</sup> is a group selected from–

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COR<sup>8'</sup>, -CONR<sup>8'</sup>R<sup>9</sup> and C<sub>1-6</sub>alkyl which C<sub>1-6</sub>alkyl is substituted by hydroxy and optionally further substituted by 1 or 2 halo or methoxy groups; R<sup>2'</sup> is a group selected from hydrogen, -COR<sup>10</sup>, -CONR<sup>10</sup>R<sup>11</sup> and C<sub>1-6</sub>alkyl which C<sub>1-6</sub>alkyl is optionally substituted by 1, 2 or 3 halo or C<sub>1-4</sub>alkoxy groups, -S(O)<sub>p</sub>R<sup>11</sup> (where p is 0, 1 or 2) or hydroxy, or R<sup>2'</sup> is a group selected  
5 from C<sub>2-6</sub>alkenyl, C<sub>2-6</sub>alkynyl, C<sub>3-6</sub>cycloalkyl and C<sub>3-6</sub>cycloalkylC<sub>1-4</sub>alkyl; or R<sup>1'</sup> and R<sup>2'</sup> together with the nitrogen to which they are attached form a 4- to 7- membered ring optionally containing a further nitrogen atom which ring may be saturated, unsaturated or partially saturated and which ring is substituted on carbon or nitrogen by a group selected from hydroxy and C<sub>1-4</sub>alkyl which C<sub>1-4</sub>alkyl is substituted by hydroxy or -NR<sup>8'</sup>R<sup>9</sup> and which  
10 ring is optionally further substituted on carbon or nitrogen by 1, 2 or 3 halo or C<sub>1-4</sub>alkyl groups; and where R<sup>8'</sup> is C<sub>1-4</sub>alkyl substituted by hydroxy and optionally further substituted by 1 or 2 halo or methoxy groups:  
and thereafter if necessary:  
i) converting a compound of the formula (I) into another compound of the formula (I); and/or  
15 ii) removing any protecting groups; and/or  
iii) forming a pharmaceutically acceptable salt thereof.